



Liquid Industrial By-products Reporting Regulations

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Goals

- What is a liquid industrial by-product?
- Quick overview of liquid industrial by product general requirements:
 - Generator, transporter, and designated (receiving) facility
- Identify additional “designated facility” or receiving facility requirements, including:
 - Reporting
 - Emergency planning
 - Training

Waste Regulations

- Waste regulations governing proper characterization, accumulation, and recycling or disposal are found in Act 451, Michigan Natural Resources & Environmental Protection Act (NREPA):
 - [Part 111](#), Hazardous Waste, and the [Part 111 rules](#)
 - [Part 121](#), Liquid Industrial By-Product
 - [Part 115](#), Solid Waste, and the [Part 115 rules](#)
 - [Part 169](#), Scrap Tires
 - [Part 117](#), Septage
- Medical waste characterization, accumulation, and disposal requirements are found in [Act 368](#), Michigan Public Health Code, [Part 138](#), Medical Waste Regulatory Act and the Part 138 rules
- Federal Toxic Substance Control Act ([TSCA](#))

Liquid Industrial By-Products, Definitions – 12101(n)

- A material that is...
 - produced by or is incident to an enterprise or non-household activity
 - liquid as determined by the paint filter test
 - discarded
- Liquid industrial by-products include:
 - most discarded liquids pumped and hauled over public roadway not subject to hazardous waste regulation
 - Liquids and sludges sent to a solid waste solidification facility prior to landfilling
- Must be specifically excluded by statute to not be subject to regulation as a liquid industrial by-product

Liquid Industrial By-products, Exclusions - 12101(n)

- Liquid industrial by-product does not include any of the following:
 - Hazardous waste from SQGs or LQGs (Part 111)
 - Septage waste (Part 117)
 - Medical waste (Act 363, Part 138)
 - Discarded liquids from residents (Part 115)
 - Fats, oil, grease managed under Act 239
 - Part 31 permitted point source wastewater discharges (NPDES or groundwater permits)
 - Material managed to meet Section [12102a](#)

Liquid Industrial By-products Definitions – 120101(k)(m), & 12102(m)

- Generator - Person whose act or process produces liquid industrial by-product.
- Transporter - Person engaged in the off-site transportation of liquid industrial by-product by air, rail, public roadway, or water.

- **Designated Facility - Treatment, storage, disposal, or reclamation facility that receives liquid industrial by-product from off-site.**

Liquid Industrial By-products Definitions – 12102(a)

- On-site means on the same geographically contiguous property, which may be divided by a public or private right-of-way if access is by crossing rather than going along the right-of-way.
- On-site includes noncontiguous pieces of property owned by the same person but connected by a right-of-way that the owner controls and to which the public does not have access.

Liquid Industrial By-products Designated Facility Examples

- Central waste treatment facilities
- Used oil processors
- **Waste water treatment plants**
- Hazardous secondary material handlers
- Facilities receiving fuel for re-refining (RPP fuel)
- CESQG hazardous waste collection sites
- Food waste processors
- Renderers
- Anaerobic digesters
- Biofuel producers
- Non-hazardous liquid by-product & septage transporters with storage and consolidation facilities

General Requirements for Liquid Industrial By-product Generation, Transport, Disposal – 12112 and 12113

- By-product treatment, storage or disposal by the generator, transporter or designated facility must be in containers or tanks.
- By-product treatment, storage or disposal is exempt from Part 121, section 12112 and 12113 if regulated under part 615, Supervisor of Wells, or regulated under part C of title XIV of the public health service act.
- By-product managed by the generator, transporter or designated facility shall be:
 - Protected from weather, fire, physical damage and vandals
 - All vehicles, containers and tanks used to hold by-product shall be closed or covered, except when necessary to add or remove by-product
- By-product managed by the generator, transporter or designated facility shall be managed such that:
 - Exterior of all vehicles, containers and tanks used to hold by-product are free of by-product and residues
 - All vehicles, containers and tanks must be closed or covered when not in use
 - Unless otherwise specifically authorized, by-product cannot be discharged to soil, surface water, ground water, a drain, sewer, or the air

What is a Closed Container?

- Regulations do not define “closed container”
- Requiring containers to be closed is a means to minimize emissions of volatile wastes, to protect ignitable or reactive wastes from sources of ignition or reaction, to prevent spills, to reduce the potential for mixing of incompatible wastes and reduce direct contact of personnel with waste
- For liquid containers in storage:
 - Cover secured with snap rings bolted
 - Bung holes capped
 - If needed, pressure-vacuum relief valve to avoid explosions
- For liquid containers in use:
 - Lids properly affixed to prevent spills
 - Funnels with manual or spring-loaded lids or tightly screwed into bung hole with a one-way valve (right)



- Non-pressurized mobile oil drain pans, at a minimum, must be emptied when not in use to be considered closed or at the end of the day generally (right)



Liquid Industrial By-product Designated Facility - Reporting

- Annual report for designated facilities is due by April 30th each year starting 2017
- Annual report is to describes activities for previous calendar year
- Electronic reporting method is required of the DEQ
- Required reporting includes:
 - Name and address of the designated facility
 - Calendar year covered by the report
 - Types and quantities of by-product received
 - Description of the manner in which the by-product was processed or managed
- Liquid industrial by-product waste stream selection options for the 2017 designated facility annual reporting period, include:
 - Hazardous Secondary Materials
 - Mixed Solvents
 - Pharmaceutical
 - Crankcase Oil
 - Coolants and Water-Soluble Oils
 - Other Oil
 - Brine
 - Pesticides
 - PCB
 - Landfill Leachate
 - Other wastes
 - Antifreeze
 - Storm Sewer Cleanouts
 - Sanitary Sewer Cleanouts
 - X-Ray/Photo Cleaning Solutions
 - Water Based Cleaning Solutions
 - Car Wash Sludges
 - Grease Trap Wastes
 - **Other – Must add description!!!**

2016 Reporting Designated Facility

- 95 submittals
- Most cover multiple sites owned and operated by same company
- 41 used oil processors across state
 - 12 submitted 2015 Biennial Reports
 - 14 submitted a 2016 Annual Report

2017 Reporting Designated Facility

- Due April 30, 2018
- Reviewing whether single report can be submitted for both Part 111 used oil biennial reporters AND liquid industrial by product annual reporters
- **Anticipate significant number of additional reporters**
- Reporting does not apply if the designated facility received by-product from only 1 generator and was owned, operated or legally controlled by that generator

What about municipal wastewater treatment plants (WWTP) - Do they have to submit an annual report?

- **Answer: Maybe!!!**
- **New Receiving (designated) Facility Reporting Guide (right)**

RECEIVING FACILITY REPORTING REGULATIONS:					Michigan Department of Environmental Quality	
Biosolids, Medical Waste, Liquid Industrial By-products, Septage, Sanitary Sewer & Combined Sanitary Sewer Wastewaters, and Stormwater						
WASTE DESCRIPTION	ACT 451, NREPA* REGULATORY CITATION	RESPONSIBLE DIVISION	REPORTING DUE DATE	ADDITIONAL ONLINE RESOURCES	REPORTED INFORMATION	
Separate or combined sanitary sewer system maintenance waste from system subject to Part 31 NPDES or groundwater discharge permit	Part 31, Section 3112a and discharge permit	WRD	Initial report due immediately, no more than 24 hours after the release begins	DEQ SSO-CSO website	Amount and quality of the discharge, cause of the discharge, impacted water and/or land area, beginning and end time of the discharge, and permittee's compliance status.	
Biosolids land applied via a Part 31 approved Residual Management Program	Part 24 Rules, Rule 2403(3)	WRD	October 30 of each year	DEQ Biosolids program website	Dry tons of land applied biosolids, analytical data, pathogen and vector attraction reduction documentation, land application site summary, and permittee compliance certifications.	
Sewage sludge or other non-hazardous residuals from WWTP failing the paint filter test and being disposed	Part 121, Section 12101(n) and Section 12112(5)	WMRPD	April 30 of each year	Form EQP 1602, Instructions Part 121 Liquid Industrial By-products Reporting Web page	Amount of liquid industrial by-products accepted in prior calendar year (January 1 - December 31)	
Combined sanitary sewer system maintenance wastes from a satellite system not subject Part 31 NPDES or groundwater discharge permit	Part 121, Section 12101(n) and Section 12112(5)	WMRPD	April 30 of each year	Form EQP 1602, Instructions Part 121 Liquid Industrial By-products Reporting Web page	Amount of liquid industrial by-products accepted in prior calendar year (January 1 - December 31)	
Separate stormwater sewer system maintenance waste (permitted or not permitted)	Part 121, Section 12101(n) and Section 12112(5)	WMRPD	April 30 of each year	Form EQP 1602, Instructions Part 121 Liquid Industrial By-products Reporting Web page	Amount of liquid industrial by-products accepted in prior calendar year (January 1 - December 31)	
Industrial and commercial wastewaters and sludges not subject to hazardous waste, medical waste, or septage regulation. ¹	Part 121, Section 12101(n) and Section 12112(5)	WMRPD	April 30 of each year	Form EQP 1602, Instructions Part 121 Liquid Industrial By-products Reporting Web page	Amount of liquid industrial by-products accepted in prior calendar year (January 1 - December 31)	
Separate sanitary sewer system maintenance waste from a satellite system not subject to a Part 31 NPDES or groundwater discharge permit	Part 121, Section 12101(n) and Section 12112(5)	WMRPD	April 30 of each year	Form EQP 1602, Instructions Part 121 Liquid Industrial By-products Reporting Web page	Amount of liquid industrial by-products accepted in prior calendar year (January 1 - December 31)	
Separate sanitary sewer system maintenance waste transported to same system receiving facility from a satellite system not subject to a Part 31 NPDES or groundwater discharge permit	Part 117, Section 11703(5)	DWMAD	March 15 each year with annual invoice	Reporting form EQP 6921 www.michigan.gov/desseptage	Amount of septage transported or disposed, location where septage was disposed each month in prior calendar year (January 1 - December 31) and any complaints received concerning septage disposal.	
Septage waste from on-site wastewater systems ²	Part 117, Section 11703(5)	DWMAD	March 15 each year with annual invoice	Reporting form EQP 6921 www.michigan.gov/desseptage	Amount of septage transported or disposed, location where septage was disposed each month in prior calendar year (January 1 - December 31) and any complaints received concerning septage disposal.	
Non-hazardous medical wastewaters ³	Act 368, Part 138 and Part 138 rules	WMRPD	NA	Medical Waste Program Website www.michigan.gov/deqmedwaste	Part 138 does not require reporting. However, IIS DOT shipping documents must be maintained for any medical waste transported.	

*NREPA: Natural Resource and Environmental Protection Act

¹ Liquid industrial by-products include commercial and industrial wastewaters and sludges that must be hauled over public roadway from operations like food processing or commercial animal boarding, breeding, and sale; car wash, laundromat, and power washing wastewaters and sludges; antifreeze, leachate, and other wastewaters and sludges from service operations generated by non-households. Also includes fats, oils, and grease or other domestic wastewaters not subject to septage regulation, Part 31 wastewater discharge permitting via permit, rule or order; nor other regulation like hazardous waste, medical waste, etc.

² Septage includes only food establishment septage, domestic septage, domestic treatment plant septage, or separate sanitary sewer cleanout septage, or any combination of these. On-site septic systems are permitted and inspected by the local health departments and only designed to handle sanitary wastewaters from bathrooms, kitchens and laundry devices.

³ Non-hazardous medical wastewaters include wastewaters from funeral homes, animal processing, and healthcare (dental, veterinarian, family medicine, etc.)

800-662-9278 www.michigan.gov/deq March 2018



Septage Exclusions – 12101(n)(ii)

- Septage includes only:
 - Food establishment septage, which means material pumped from a grease interceptor, grease trap, or other appurtenance used to retain grease or other fatty substances contained in restaurant wastes and which is blended into a uniform mixture, consisting of not more than 1 part of that restaurant-derived material per 3 parts of domestic septage, prior to land application or disposed of at a receiving facility.
 - Domestic septage, which is a liquid or solid material removed from a septic tank, cesspool, portable toilet, type III marine sanitation device, or similar storage or treatment works that receives only domestic sewage. Domestic septage does not include liquid or solid material removed from a septic tank, cesspool, or similar facility that receives either commercial wastewater or industrial wastewater and does not include grease removed from a grease interceptor, grease trap, or other appurtenance used to retain grease or other fatty substances contained in restaurant waste.
 - Domestic treatment plant septage, which means biosolids generated during the treatment of domestic sewage in a treatment works and transported to a receiving facility or managed in accordance with a residuals management program approved by the department.
 - Separate sanitary sewer cleanout septage, or
 - Any combination of the above.
- On-site septic systems are permitted and inspected by the local health departments and only designed to handle sanitary wastewaters from bathrooms, kitchens and laundry devices.

Part 31 Permitted Point Source Exclusions - 12101(n)(iv)

- Permitted direct discharges to sanitary or combined sewer authorized by receiving WWTP.
- Generators must possess/meet WWTP discharge permit (part of waste characterization record)
- **Any accumulation before discharge to sewer must meet Part 121.**

Part 31 Permitted Point Source Exclusions - 12101(n)(iv)

- Liquid industrial by-product does not include sanitary or combined sewer systems clean-out waste IF:
 - The system is operated by a WRD NPDES or groundwater permitted WWTP
 - All indirect releases of clean-out waste (during transport, treatment, etc.) to land or water must
 - be managing to meet WRD permit and
 - be reported to WRD per Part 31, [Section 3112a](#) if a release occurs
- Sanitary and combined sewers not possessing a Part 31 NPDES or groundwater permit must be managed to meet Part 121 and facilities receiving these liquids are Part 121 designated facilities.
- Sanitary and combined sewer systems expected to not possess a Part 31 NPDES or groundwater permit likely include:
 - Systems that convey sanitary and combined sanitary and storm waters to a WWTP owned and operated by another party
 - Systems authorized by local health departments, not WRD

So, how does a designated facility report?

- Form and instructions are on the DEQ webpage at www.michigan.gov/deqwaste under “Announcements” tab
- Forms should be submitted to DEQ-Part-121-Reporting@Michigan.gov

The screenshot shows the DEQ WASTE website. At the top, it says "DEQ WASTE" and "Protecting Michigan's Environment". Below that, there's a navigation menu with tabs for "Announcements", "Solid Waste", "Hazardous Waste", "Transporters", and "Radiological Protection". The "Announcements" tab is selected and circled in red. Below the navigation menu, there's a list of announcements. A red arrow points to the link "Michigan Site Identification Form (directions not included) Revised 5/2010". To the right of the announcements, there's a "Quick Picks" section with several links, and a "Spotlight" section for the "Michigan Radiation Environmental Monitoring Program Report". At the bottom of the page, it says "Waste Management & Regulations Webinar Series".

What if you handle liquid industrial by product generated on-site (not brought in from off-site) - Do you have to do an annual report for that by product?

- **Answer: No.**
- The reporting requirement applies only to receipt of by product from off site.
- The site still needs to maintain records of by product treated on site.

Liquid Industrial By-products Treatment, Storage, and Disposal

- By product cannot be treated, stored or disposed of in a surface impoundment, unless
 - The impoundment has a discharge or storage permit under part 31 (Water)
 - In the case of leachate, is authorized by a permit issued under part 115 (Solid Waste)
- Part 121 does not:
 - prohibit a municipal wastewater treatment plant (WWTP) from accepting liquid industrial by-product from a person
 - prohibit a person from engaging, employing or contracting with a WWTP
- **If the WWTP receives liquid industrial by-product via transport over public roadway and the transport is not specifically regulated via the Part 31 authorization (NPDES or groundwater permit) or a Part 31 rule, the liquid industrial by-product is subject to Part 121**

Site Identification (ID)

- Site ID is required for liquid industrial by-product transportation and designated facility activities
- Site IDs are also required of self-transporters
- Generators no longer need site IDs due to a March 2016 [law change](#)
- Use EQP 5150 [Form](#) – Notification of Regulated Waste Activity to obtain Site ID

Liquid Industrial By-product Shipments – Designated Facility

- Can only accept delivery of by-product if the facility is the destination indicated on the shipping document
- Must provide the generator or authorized representative confirmation of receipt of liquid industrial by-product
- Must maintain records of characterization
- By-product cannot be stored for longer than 1 year UNLESS:
 - It is stored for reclamation AND
 - Not less than 75% of the cumulative amount, by weight or volume of each type of by-product stored is reclaimed or transferred to a different site for reclamation during that calendar year
- Documentation is required to ensure storage beyond is authorized

Emergency Response – Designated Facility

- Designated facilities must have a plan to respond to and minimize hazards to human health and the environment from unplanned sudden and non-sudden releases
- Owner/operator of a designated facility shall:
 - Retain all required records for 3 years
 - Make records readily available for review and inspection
 - Electronic recordkeeping is acceptable but must be readable, have all the required information, and be accessible

Recordkeeping– Designated Facility

- Owner/operator of a designated facility shall:
 - Retain all required records for 3 years
 - Make records readily available for review and inspection
 - Electronic recordkeeping is acceptable but must be readable, have all the required information, and be accessible

Training – Designated Facility

- Designated facilities must document that employees who manage by-product are trained in proper handling and emergency response as appropriate for their job duties

Collecting Diverted Waste – Designated Facility

- Part 115, Section 11521b has additional requirements that apply to waste diverted to environmental preferred management options like:
 - access must be limited to a time when a responsible individual is on duty

- if stored overnight, the area must be secure and have containment to prevent the release of diverted wastes
- The materials handled must be documented (types, volume, and disposition) for at least 3 years
- The materials cannot be accumulated for more than 1 year

Collecting CESQG Waste – Designated Facility

- Rule 205(4) has additional requirements for collecting CESQG liquids like:
 - Container labeling and dating
 - Maximum 180-day accumulation
 - **Accumulation cannot exceed 6,000 kg non-acute hazardous waste and if it does, the site requires a hazardous waste storage license!**
- For more information on collecting diverted or CESQG waste, view our recorded webinar available at www.michigan.gov/deqwaste under “Announcements”

Liquid Industrial By-Product Publications

- [Example Shipping Document](#)
- [Liquid Industrial By-product FAQ](#)
- [Liquid Industrial By-product Generator Guidance](#)
- [NEW Receiving \(designated\) Facility Reporting Guide](#)
- Find these resources by name using a search engine, using the DEQ “Publications” search on the bottom of all DEQ pages, or selecting the links above.